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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/608,151	06/30/2000	Shinichi Nakayama	520.38682X00	9853

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EXAMINER

ELAMIN, ABDELMONIEM I

ART UNIT

PAPER NUMBER

2182

DATE MAILED: 12/18/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.
09/608,151

Applicant(s)
Nakayama et al

Examiner
Abdelmoniem Elamin

Art Unit
2182



-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on Jun 30, 2000
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above, claim(s) _____ is/are withdrawn from consideration
- 5) ☒ Claim(s) 7-9 is/are allowed.
- 6) ☒ Claim(s) 1-6 and 10 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some* c) ☐ None of:
- ☒ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- *See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____ 6) ☐ Other:

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DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371© of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) do not apply to the examination of this application as the application being examined was not (1) filed on or after November 29, 2000, or (2) voluntarily published under 35 U.S.C. 122(b). Therefore, this application is examined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

2. Claims 1-6 and 10, are rejected under 35 U.S.C. 102(e) as being anticipated by Sanada et al, US. Pat. No. 6,484,245.

3. Claims 1, 2, 5 and 10, Sanada teaches a storage controller [*storage controller 40 of Fig. 1, see title, abstract*] for controlling transfer of input/output data to and from a lower level external apparatus [*Disk array system 50 of Fig. 1*] in response to input/output requests received from a

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higher level external apparatus [*Host computers 10, 20 and 30 of Fig. 1*], said storage controller comprising;

at least one external interface controller for receiving said input/output requests from said higher level external apparatus in accordance with a type of interface with said higher level external apparatus [*Fig. 1*];

at least one control processor which processes said input/output requests [*Fiber channel control unit 41 of Fig. 1, col. 5, lines 38-44*]; and

a fibre channel interface loop interposed between said external interface controller and said control processor so as to serve as a channel through which information is transferred therebetween [*Fiber channel fabric 60 of Fig. 1*].

4. Claims 3-4, Sanada teaches said external interface controller is capable of interface conversion between said fibre channel interface loop and an interface other than fibre channel [*col. 1, lines 50-67, col. 6, lines 14-31*].

5. Claim 6, Sanada teaches frame reading means for reading a frame from any of said input/output requests sent through said loop [*Figs 2-5, 7 and 9*].

Allowable Subject Matter

6. Claims 7-9 allowed.

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Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Abdelmoniem I. Elamin whose telephone number is (703) 305-3804. The examiner can normally be reached Monday through Friday from 9:30 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jeffrey Gaffin, can be reached at (703)308-3301.

Any inquiry of a general nature relating to the status of this application should be directed to the Group receptionist whose telephone number is (703)305-3900.

Any response to this action should be mailed to:

Commissioner of Patents and trademarks

Washington, D.C. 20231

Or faxed to:

(703) 746-7239 (Official)

(703) 746-7240 (Non-Official/Draft)

(703) 746-7238 (After-final)

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*Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA,
Forth Floor (receptionist).*

Respectively submitted



Abdelmoniem Elamin

December 11, 2002